

## ABSTRACT OF THE DISCLOSURE

A low-noise current reference circuitry includes a voltage source, a current source, and a controller. The voltage source generates a reference voltage. The current source provides a low-noise output current in response to a control signal. The controller provides the control signal based at least in part on the relative magnitudes of the reference voltage and a voltage derived from the output current.. A low-noise voltage reference circuitry includes a reference voltage source, a voltage source, and a controller. The reference voltage source generates a reference voltage. The voltage source provides a low-noise output voltage in response to a control signal. The controller provides the control signal based at least in part on the relative magnitudes of the output voltage and the reference voltage.